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1	Substitut	e for form 1449/PTO			Application Number	10/717,814	
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		OTHER PRIOR ART-NON PATENT LITERATURE DOCUMENTS	
Examiner Initials*	Cite No.1	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T²
SICP		European Patent Office; European Search Report; February 23, 2005; 3 pages.	
SKP		MACFARLANE; "How seawater, temperature, pressure degrade polymeric materials"; Materials Science/Engineering; Offshore - www.offshore-mag.com; December 2000; 2 pages.	
· ·		SANVITO, G.; "Peroxide Vulcanised Perfluoroelastomers"; Macplas; 27; No. 235; Issn: 0394-3453; January/February 2002; Pages 108-110.	
SKP		"Oilfield Engineering with Polymers Conference"; 4th MERL Conference, London, UK; Rapra Technology Ltd & MERL Limited; November 3-4 2003; Pages 248-258.	

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1 Applicant's unique citation designation number (optional). 2 Applicant is to place a check mark here if English language Translation is attached.

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INFORMATION DISCLOSURE ATEMENT BY APPLICANT

Coi	mplete if Known	
Application Number	10/717,814	
Fiting Date	November 20, 2003	
First Named Inventor	Jeremy Buc Slay et al.	
Art Unit	3676	
Examiner Name	Unassigned	
Attorney Docket Number	1301-1161	

			U. S. PATENT	DOCUMENTS	
Examiner Initials*	Cite No.1	Document Number Number-Kind Code ² (* Innom)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
SKP		^{US-} Re. 36,452	12-21-1999	Upton et al.	
1		^{US-} 6,123,337	09-26-2000	Fang et al.	
		US- 2002/0052434 A1	05-02-2002	Lichtenhan et al.	
		^{US-} 2002/0055581 A1	05-09-2002	Lorah et al.	
\neg		^{US-} 2003/0039816 A1	02-27-2003	Wang et al.	
		^{US-} 6,536,542 B1	03-25-2003	Fang et al.	
		US- 6,554,070 B2	04-29-2003	Genolet et al.	
1		US- 2003/0187124 A1	10-02-2003	Hirata et al.	
V		US- 2005/0109544 A1	05-26-2005	Ray et al.	
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		Country Code ³ Number ⁴ Kind Code ⁵ (# known)	MM-DD-YYYY		Or Relevant Figures Appear	٣
SKP		WO 98/10012	03-12-1998	Raychem Corporation		
7		JA 11-293089 JP 11-293089	10-26-1999	Sumitomo Bakelite		
		CN 1289812	04-04-2001	Li Shirong		
		JA 2001-158849 JP 2001-158849	06-12-2001	Kuraray Co Ltd		
		WO 03/072646	09-04-2003	Siemens Aktiengesell		
		JA 2004-075707 JP 2004-075707	03-11-2004	Sekisui Chem Co Ltd		Г

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Complete if Known Substitute for form 1449/PTO **Application Number** 10/717,814 Filing Date November 20, 2003 INFORMATION DISCLOSURE First Named Inventor Jeremy Buc Slay et al. STATEMENT BY APPLICANT **Art Unit** 3676 (Use as many sheets as necessary) **Examiner Name** Unassigned Attorney Docket Number | 1301-1161 Sheet 2 of 2

U. S. PATENT DOCUMENTS Publication Date Name of Patentee or Pages, Columns, Lines, Where Examiner Cite Document Number No. MM-DD-YYYY Applicant of Cited Document Relevant Passages or Relevant Initials' Figures Appear Number-Kind Code^{2 (f known)} US-US-US-UŞ-US-ับร-US-USiis. US-US-USus-US-US-US-บร-US. US-

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Sheet 1

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

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Cor	mplete if Known	
Application Number	10/717,814	
Filing Date	November 20, 2003	
First Named Inventor	Jeremy Buc Slay et al.	
Art Unit	3676	
Examiner Name	Unassigned	
Attorney Docket Number	1301-1161	

			U. S. PATENT	DOCUMENTS	
Examiner Initials*	Cite No.1	Document Number Number-Kind Code ^{2 (F Innom?)}	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
SKP		^{US-} 5,169,887	12-08-1992	Snow et al.	
ا		^{US-} 5,385,984	01-31-1995	Blohm et al.	
		^{US-} 5,552,469	09-03-1996	Beall et al.	
1		^{US-} 5,578,672	11-26-1996	Beall et al.	
	-	^{US-} 5,698,624	12-16-1997	Beall et al.	
1		^{US-} 5,721,306	02-24-1998	Tsipursky et al.	
		^{US-} 5,760,121	06-02-1998	Beall et al.	
_		^{US-} 5,804,613	09-08-1998	Beall et al.	
		^{US-} 5,830,528	11-03-1998	Beall et al.	
		^{US-} 5,844,032	12-01-1998	Serrano et al.	
		^{US-} 5,849,830	12-15-1998	Tsipursky et al.	
		^{US-} 5,877,248	03-02-1999	Beall et al.	
		^{US-} 5,880,197	03-09-1999	Beall et al.	
\neg		^{US-} 5,952,095	09-14-1999	Beall et al.	
		US- 5,998,528	12-07-1999	Tsipursky et al.	
·· 1		^{US-} 6,034,164	03-07-2000	Elspass et al.	
\top		^{US-} 6,050,509	04-18-2000	Clarey et al.	
1/		^{US-} 6,057,396	05-02-2000	Lan et al.	
V		^{US-} 6,083,559	07-04-2000	Beall et al.	

		FORE	IGN PATENT DOCU	MENTS		
Examiner Initiats*	Cite No.1	Foreign Patent Document	Publication Date	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages	
		Country Code ³ Number ⁴ Kind Code ⁵ (# known)	MM-DD-YYYY		Or Relevant Figures Appear	T⁵
SKP		EP 1 211 282 A1	06-05-2002	Herrmann et al.	<u></u>	ᆫ
١		DE 100 59 237 A1	06-20-2002	Herrmann et al.		
$\sqrt{}$		WO 02/079308 A1	10-10-2002	Bremser et al.		L
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Complete if Known Substitute for form 1449/PTO Application Number 10/717,814 November 20, 2003 Filing Date INFORMATION DISCLOSURE First Named Inventor Jeremy Buc Slay et al. STATEMENT BY APPLICANT Art Unit 3676 (Use as many sheets as necessary) **Examiner Name** Unassigned Attorney Docket Number 1301-1161 Sheet 2

Examiner Initials*	Cite No. ¹	Document Number Number-Kind Code ^{2 (f known)}	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
SKP		^{US-} 6,090,734	07-18-2000	Tsipursky et al.	
		^{US-} 6,107,387	08-22-2000	Kaylo et al.	
		^{US-} 6,124,365	09-26-2000	Lan et al.	
		^{US-} 6,126,734	10-03-2000	Beall et al.	
		^{US-} 6,225,394	05-01-2001	Lan et al.	
		^{US-} 6,228,903	05-08-2001	Beall et al.	
T	1	^{US-} 6,232,388	05-15-2001	Lan et al.	
		US-6,235,533	05-22-2001	Tsipursky et al.	
		^{US-} 6,242,500	06-05-2001	Lan et al.	
1		^{US-} 6,251,980	06-26-2001	Lan et al.	
	i -	^{US-} 6,262,162	07-17-2001	Lan et al.	
1		^{US-} 6,362,279	03-26-2002	Lichtenhan et al.	
		^{US-} 6,399,690	06-04-2002	Lan et al.	
\top		US- 6,376,591	04-23-2002	Lan et al.	
1		US- 6,387,996	05-14-2002	Lan et al.	
	 	US- 6,391,449	05-21-2002	Lan et al.	
		^{US-} 6,407,155	06-18-2002	Qian et al.	
		US- 6,461,423	10-08-2002	Beall et al.	
V		US- 6,462,122	10-08-2002	Qian et al.	

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		OTHER PRIOR ART-NON PATENT LITERATURE DOCUMENTS	
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SKP		BUC SLAY et al.; "What Engineers Need to Know About Seals and Sealing Technology"; Energy Rubber Group - 2003 Fall Technical Symposium; September 16, 2003; pages 1-24.	
		ALEXANDER GALEZEWSKI et al.; "Thermosetting Cellular Elastomers Reinforced with Carbon Black and Silica Nanoparticles"; Journal of Elastomers and Plastics; Vol. 33; January 2001; pages 13-33.	
		"Polymer Preprints"; Division of Polymer Chemistry, Inc.; American Chemical Society; Volume 42, Number 2; Fall 2001; pages 885-886.	
		MICHELE VACATELLO; "Molecular Arrangements in Polymer-Based Nanocomposites"; Macromol Theory Simul. 2002, 11, No. 7; pages 757-765.	
		"Nanomaterials - A Big Market Potential"; Chemical Week; October 16, 2002; pages 17-20.	
		"Organic/Inorganic Hybrid Polymer/Clay Nanocomposites"; NASA Tech Briefs; December 2003; page 21.	
		Prof. E.P. GIANNELIS; "Polymer Nanocomposites"; Cornell University; page 1-2.	
		SIBY VARGHESE et al.; "Rubber Nanocomposites via Solutions and Melt Intercalation"; Presented at a meeting of the Rubber Division, American Chemical Society; Paper No. 43A; October 14-17, 2003; pages 1-24.	
		L.A. GOETTLER et al.; "Layered Silicate Nanocomposites Comprising Rubbery Polymer Matrices"; Presented at a meeting of the Rubber Division, American Chemical Society; Paper No. 41; October 14-17, 2003; 9 pages.	
V		SUSMITA SADHU et al.; "Acrylonitrile Butadiene Rubber Based Nanocomposites: Preparation and Mechanical Properties"; Presented at a meeting of the Rubber Division, American Chemical Society; Paper No. 42; October 14-17, 2003; pages 1-12.	

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INF	ORMATION	DIS	CLOSURE	Filing Date	November 20, 2003		
STA	TEMENT B	YA	PPLICANT	First Named Inventor	Jeremy Buc Slay et al.		
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SKP		ABHIJIT BANDYOPADHYAY et al.; "Synthesis and Characterization of Acrylic Rubber/Silica Nanocomposites by Sol-Gel Technique"; Presented at a meeting of the Rubber Division, American Chemical Society; Paper No. 43; October 14-17, 2003; pages 1-20.	
		LIMING DAI et al.; "Polymer and Aligned Carbon Nanotube Nanocomposites"; Presented at a meeting of the Rubber Division, American Chemical Society; Paper No. 39; October 14-17, 2003; pages 1-14.	
		ARNAB SARKAR et al.; "An Analysis of the Microscopic Deformation Field in Rubbers Filled with Nono-Particles"; Presented at a meeting of the Rubber Division, American Chemical Society; Paper No. 40; October 14-17, 2003; 17 pages.	
		SHANNON M. LLOYD et al.; "Life Cycle Economic and Environmental Implications of Using Nanocomposites in Automobiles"; ACS Publications; April 28, 2003; pages 3458-3466.	
		SUPRAKAS SINHA RAY et al.; "New Polylactide/Layered Silicate Nanocomposites"; Macromolecules; January 15, 2002; pages 3104-3110.	
		BO-HYUN KIM et al.; "Nanocomposite of Polyaniline and Na+ - Montmorillonite Clay"; Macromolecules; October 10, 2001; pages 1419-1423.	
		JOO YOUNG NAM et al.; "Crystallization Behavior and Morphology of Biodegradable Polylactide/Layered Silicate Nanocomposite"; ACS Publications; July 27, 2003; 1 page.	
		PETER C. LeBARON et al.; "Clay Nanolayer Reinforcement of a Silicone Elastomer"; ACS Publications; June 26, 2001; 1 page.	
		CHRISTOPHE DANUMAH et al.; "Novel Polymer Nanocomposites from Templated Mesostructured Inorganic Materials"; Macromolecules; April 14, 2003; pages 8208-8209.	
		HORNG-LONG TYAN et al.; "Thermally and Mechanically Enhanced Clay/Polyimide Nanocomposite via Reactive Organoclay"; ACS Publications; May 11, 1999; 1 page.	

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STA	TEMENT	BY A	PPLICANT	First Named Inventor	Jeremy Buc Slay et al.			
	**			Art Unit	3676			
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Sheet	3	of	11	Attorney Docket Number	1301-1161	7		

		OTHER PRIOR ART-NON PATENT LITERATURE DOCUMENTS						
Examiner Cite No.1								
SKP		HORNG-LONG TYAN et al.; "Effect of Reactivity of Organics-Modified Montmorillonite on the Thermal and Mechanical Properties of Montmorillonite/Polyimide Nanocomposites"; ACS Publications; October 24, 2000; 1 page.						
		JEFFREY W. GILMAN et al.; "Flammability Properties of Polymer-Layered-Silicate Nanocomposites." Polypropylean and Polystyrene Nanocomposites"; ACS Publications; May 8, 2000; 2 pages.						
		JEFFREY W. GILMAN et al.; "Polymer/Layered Silicate Nanocomposites from Thermally Stable Trialkylimidazolium-Treated Montmorillonite"; ACS Publications; March 29, 2002; 1 page.						
		BENEDICTE LEPOITTEVIN et al.; "Poly (-caprolactone)/Clay Nanocomposites by in-Situ Intercalative Polymerization Catalyzed by Dibutyltin Dimethoxide"; Macromolecules; August 2, 2002; pages 8385-8390.						
		PASCAL VIVILLE et al.; "Surface Characterization of Poly (-caprolactone)-Based Nanocomposites"; Langmuir; July 14, 2003; pages 9425-9433.						
		BRET J. CHISHOLM et al.; "Nanocomposites Derived from Sulfonated Poly (butylene terephthalate)"; Macromolecules; December 21, 2001; pages 5508-5516.						
		J.E. MARK; "Some Recent Theory, Experiments, and Simulations on Rubberlike Elasticity"; ACS Publications; August 6, 2002; 1 page.						
		FRANCIS W. STARR et al.; "Molecular Dynamics Simulation of a Polymer Melt with a Nanoscopic Particle"; Macromolecules; December 3, 2001; pages 4481-4492.						
		YUQIN LI et al.; "A differential Scanning Calorimetry Study of the Assembly of Hexadecylamine Molecules in the Nanoscale Confined Space of Silicate Galleries"; ACS Publications; December 21, 2001; 1 page.						
V		Q.H. ZENG et al.; "Molecular Dynamics Simulation of Organic-Inorganic Nanocomposites: Layering Behavior and Interlayer Structure of Organoclays"; ACS Publications; October 6, 2003; 1 page.						

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		CYNTHIA A. MITCHELL et al.; "Dispersion of Functionalized Carbon Nanotubes in Polystyrene"; Macromolecules; June 10, 2002; pages 8825-8830.				
		"Buckytube Properties & Uses"; Carbon Nanotechnologies Incorporated; 1 page.				
		"General Information About Nanomers"; Nanocor; 2 pages.				
		"Polymer Benefits"; Nanocor; 2 pages.				
		"Nanoclays for Plastics"; Elementis Specialties; 1 page.				
		"About Bentonite"; Laviosa Chimica Mineraria; 1 page.				
		"Carbon Nanotubes: A Small-Scale Wonder"; Newsfront; February 2003; 2 pages.				
		DANIEL T. COLBERT; "Single-wall nanotubes: a new option for conductive plastics and engineering polymers"; Plastics Additives & Compounding; January/February 2003; 7 pages.				
V		TIE LAN et al.; "Applications of Nanomer in Nanocomposites: From Concept to Reality"; Nanocor; June 25-27, 2001; 10 pages.				

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Examiner	Cite	OTHER PRIOR ART-NON PATENT LITERATURE DOCUMENTS Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of	
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		ALAN ESKER; "Interfacial Properties of Amphiphilic POSS derivatives"; POSS Nanotechnology Conference 2002; September 2002; 1 page.	
		ADAM STRACHOTA; "POSS Reinforced Epoxy Systems"; POSS Nanotechnology Conference 2002; September 2002; 1 page.	
		V. BELLAS et al.; "First Results on the Lithographic Evaluation of New POSS Containing 157nm Photoresists"; POSS Nanotechnology Conference 2002; September 2002; 6 pages.	
		JUNCHAO HUANG et al.; "Preparation and Properties of Polyimide-POSS Nanocomposites; POSS Nanotechnology Conference 2002; September 2002; 6 pages.	

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		ADAM STRACHOTA; "POSS Reinforced Epoxy Systems"; POSS Nanotechnology Conference 2002; September 2002;	
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